PATENT

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re Application of:

KAREL VAN DEN BERG

Group Art Unit: 3644

Examiner: Bret C. Hayes

Serial No.: 09/642,828

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For: A FEEDING AND/OR DRINKING COLUMN ON BEHALF OF ANIMALS

Docket No.: 8553/189

APPENDIX

Copy of Original Claims 1-28

CLAIMS

1. A feeding and/or drinking column for animals, such as cows, said column comprising a central axis surrounded by several reservoirs (3) and feeding troughs (6), as well as at least one metering device (5) for dosing feed and/or drink from at least one of the reservoirs (3) to at least one of the feeding troughs (6), characterized in that the feeding and/or drinking column is provided with a framework (1) located around the central axis, to which framework (1) primarily the feeding troughs (6) and reservoirs (3) are fitted.

2. A feeding and/or drinking column as claimed in claim 1, characterized in that a cross-section of the framework (1) perpendicular to the central axis is substantially circular.

3. A feeding and/or drinking column as claimed in claim 1 or 2, characterized in that the feeding column is provided with partitions (4) disposed between the feeding troughs (6) and having such dimensions that they prevent the animals from disturbing each other during eating or drinking.

4. A feeding and/or drinking column as claimed in any one of the preceding claims, characterized in that one or more components fitted to the framework (1) are detachable.

5. A feeding and/or drinking column as claimed in claim 4, characterized in that one or more components can be disassembled without tools being used.

6. A feeding and/or drinking column as claimed in claim 4 or 5, characterized in that a component comprises a partition (4).

7. A feeding and/or drinking column as claimed in any one of claims 4 to 6, characterized in that a component comprises a reservoir (3).

8. A feeding and/or drinking column as claimed in any one of claims 4 to 7, characterized in that a component comprises a feeding trough (6).

9. A feeding and/or drinking column as claimed in any one of claims 4 to 8, characterized in that a component comprises a metering device (5).

10. A feeding and/or drinking column as claimed in any one of claims 4 to 9, characterized in that at least one subset of the components is mutually similar in shape.

11. A feeding and/or drinking column as claimed in any one of the preceding claims, characterized in that the feeding and/or drinking column is provided with at least one weighing device which is suitable for being used in a feeding trough (6) and/or a metering device (5).

12. A feeding and/or drinking column as claimed in claim 11, characterized in that at least part of the weighing device is in particular movable about a central axis.

13. A feeding and/or drinking column as claimed in any one of the preceding claims, characterized in that the metering device (5) is disposed between at least one reservoir (3) and at least one feeding trough (6).

14. A feeding and/or drinking column as claimed in any one of the preceding claims, characterized in that the metering device (5) comprises at least one storage room.

15. A feeding and/or drinking column as claimed in any one of the preceding claims, characterized in that the metering device (5) comprises mixing means for mixing the material present in the storage room.

16. A feeding and/or drinking column as claimed in any one of the preceding claims, characterized in that the metering device (5) is rotatable about a central axis.

17. A feeding and/or drinking column as claimed in any one of the preceding claims, characterized in that the metering device (5) is provided with a drive unit (8) for moving the metering device (5).

18. A feeding and/or drinking column as claimed in any one of the preceding claims, characterized in that the feeding

and/or drinking column comprises removing means for removing substances that are unfit for consumption from the flow of feed.

19. A feeding and/or drinking column as claimed in claim 18, characterized in that the removing means comprise at least one magnet and/or at least one electromagnet (9) and/or at least one reel.

20. A feeding and/or drinking column as claimed in any one of the preceding claims, characterized in that the feeding and/or drinking column is provided with identification means for identifying an individual animal.

21. A feeding and/or drinking column as claimed in any one of the preceding claims, characterized in that the feeding and/or drinking column is movable.

22. A method of feeding animals by means of a feeding and/or drinking column as described in any one of the preceding claims, characterized in that the individual animal is identified, after which, by means of the metering device, the feed is composed of ingredients emanating from one or more reservoirs (3), depending on the nutritive need of the individual animal, and the feed is supplied to the feeding trough.

23. A method as claimed in claim 22, characterized in that, by means of a weighing device in the metering device (5), the amount of feed is attuned to the nutritive need of the individual animal.

24. A method as claimed in claim 22 or 23, characterized in that, during pouring the feed into a feeding trough (6), the amount of feed is attuned to the nutritive need of the individual animal by means of a weighing device.

25. A method as claimed in any one of claims 22 to 24, characterized in that the amount of feed is attuned to the nutritive need of the individual animal by means of a weighing device in a feeding trough (6).

26. A method as claimed in any one of claims 22 to 25, characterized in that, by means of a weighing device in a

feeding trough (6), the eating speed of the individual animal is established and the value thereof is stored in a memory.

27. A method as claimed in claim 26, characterized in that the nutritive need of the individual animal is determined with the aid of one or more values stored in a memory.

28. A method as claimed in any one of claims 22 to 27, characterized in that the feed that has not been consumed by the individual animal is automatically removed from the feeding trough (6) with the aid of removing means.